INFRASTRUCTURE, TRANSPORT AND ENVIRONMENT COMMITTEE AGENDA

THURSDAY, 5 FEBRUARY 2015

AT 8.30AM

IN COMMITTEE ROOM 1, CIVIC OFFICES, 53 HEREFORD STREET

Committee: Councillor Phil Clearwater (Chairperson)
Councillors Pauline Cotter (Deputy Chairperson), Vicki Buck, David East and Tim Scandrett.

Principal Advisers
Chief Operating Officer  Director, Council Facilities and Infrastructure
Jane Parfitt  David Adamson
Telephone: 941-6798  Telephone: 941-8149

Committee Adviser
Lucy Halsall
Telephone: 941-6227

PART A - MATTERS REQUIRING A COUNCIL DECISION
PART B - REPORTS FOR INFORMATION
PART C - DELEGATED DECISIONS

INDEX

<table>
<thead>
<tr>
<th>ITEM NO.</th>
<th>DESCRIPTION</th>
<th>PAGE NO.</th>
</tr>
</thead>
<tbody>
<tr>
<td>PART C 1</td>
<td>APOLOGIES</td>
<td>1</td>
</tr>
<tr>
<td>PART C 2</td>
<td>DECLARATION OF INTEREST</td>
<td>1</td>
</tr>
<tr>
<td>PART B 3</td>
<td>DEPUTATIONS BY APPOINTMENT</td>
<td>1</td>
</tr>
<tr>
<td>PART B 4</td>
<td>INFRASTRUCTURE REBUILD MONTHLY REPORT</td>
<td>3</td>
</tr>
<tr>
<td>PART B 5</td>
<td>REPORT BY THE CHAIRPERSON OF THE GREATER CHRISTCHURCH PUBLIC TRANSPORT WORKING GROUP</td>
<td>21</td>
</tr>
<tr>
<td>PART C 6</td>
<td>RESOLUTION TO EXCLUDE THE PUBLIC</td>
<td>25</td>
</tr>
</tbody>
</table>

For copies of Agendas and Reports, visit:
1. APOLOGIES

2. DECLARATION OF INTEREST
   Members are reminded of the need to be vigilant to stand aside from decision making when a conflict arises between their role as a member and any private or other external interest they might have.

3. DEPUTATIONS BY APPOINTMENT
1. PURPOSE AND ORIGIN OF REPORT

1.1 The Infrastructure Rebuild Unit was established in September 2014 after a reorganisation of the Council’s City Environment Group and Capital Programme Group. The Facilities and Infrastructure Rebuild team was established to focus almost entirely on rebuild related projects while the business as usual activities of Council Operations was transferred into the Chief Operations Officer’s unit, to deal with the day to day activities of running the city.

1.2 The Infrastructure Rebuild Unit is responsible for delivering the repair and rebuild of earthquake damaged horizontal infrastructure (including three waters, roading and some infrastructure related greenspace projects) whether by the Stronger Christchurch Infrastructure Rebuild Team (SCIRT) or other contractors outside the alliance.

1.3 The total value of the infrastructure rebuild programme is in the order of NZ$3 billion, subject to final funding approvals.

2. EXECUTIVE SUMMARY

2.1 The Infrastructure Rebuild Unit is responsible for the delivery of all horizontal infrastructure rebuild projects that are eligible for funding under the Council-Crown cost share agreement. This includes earthquake damaged transport assets, water and wastewater networks, stormwater and land drainage facilities as well as a limited number of green-space assets such as memorials, statues and retaining walls. The attached report provides an update on both SCIRT and non-SCIRT horizontal infrastructure works based largely on the previous month end progress results and highlighting recent activities to date.

3. BACKGROUND

3.1 The attached report (Attachment 1) is a brief summary of key activities carried out through the month in both SCIRT and non-SCIRT work programmes. Christchurch Horizontal Infrastructure Rebuild Programme – November 2014 Progress Dashboard is shown in Attachment 2.

4. COMMENT

4.1 Please refer to the commentary outlined in the attached report.

5. FINANCIAL IMPLICATIONS

5.1 Please refer to the summary contained in the attached report.

6. STAFF RECOMMENDATION

That the Infrastructure Transport and Environment Committee receives the information in this report.
Infrastructure Rebuild Report

January 2015

John Mackie
General Manager
Infrastructure Rebuild
# Table of Contents

1. Introduction ............................................................................................................3  
2. Activities for the Month .........................................................................................3  
3. Health and Safety ...................................................................................................7  
4. Environmental ........................................................................................................8  
5. Quality ....................................................................................................................9  
6. Financials .............................................................................................................10  
7. Programme ..........................................................................................................11  
8. SCIRT Projects in Handover ..............................................................................11  
9. Communications and Engagement ......................................................................12  
10. People ..................................................................................................................12
1. Introduction
The infrastructure rebuild unit is responsible for the delivery of all horizontal infrastructure rebuild projects that are eligible for funding under the CCC-Crown cost share agreement. This includes earthquake damaged transport assets, water and wastewater networks, stormwater and land drainage facilities as well as a limited number of green-space assets such as memorials, statues and retaining walls.

This report provides an update on both SCIRT and non-SCIRT horizontal infrastructure based largely on the previous month end progress results and highlighting recent activities to date.

2. Activities for the Month
The following table outlines the SCIRT life-to-date progress on repairing the horizontal infrastructure (roads and 3 waters) for the period ended 31 December 2014.

Table 1: SCIRT infrastructure rebuild progress as at 31 December 2014

<table>
<thead>
<tr>
<th>Network</th>
<th>Total</th>
<th>Current in Scope</th>
<th>% of Network</th>
<th>Estimated Construction Complete</th>
<th>% Complete</th>
</tr>
</thead>
<tbody>
<tr>
<td>Wastewater Reticulation km</td>
<td>1613</td>
<td>659</td>
<td>41%</td>
<td>353</td>
<td>54%</td>
</tr>
<tr>
<td>Pump Station repair No.</td>
<td>164</td>
<td>59</td>
<td>36%</td>
<td>32</td>
<td>54%</td>
</tr>
<tr>
<td>Pump Station new No.</td>
<td>31</td>
<td>16</td>
<td>52%</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Lift stations No.</td>
<td>65</td>
<td>27</td>
<td>42%</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Water Supply Reticulation km</td>
<td>2843</td>
<td>69</td>
<td>2%</td>
<td>51</td>
<td>74%</td>
</tr>
<tr>
<td>Pump Stations &amp; Reservoirs No.</td>
<td>220</td>
<td>73</td>
<td>33%</td>
<td>64</td>
<td>88%</td>
</tr>
<tr>
<td>Stormwater Reticulation km</td>
<td>329</td>
<td>26</td>
<td>8%</td>
<td>14</td>
<td>52%</td>
</tr>
<tr>
<td>Pump Station repair No.</td>
<td>38</td>
<td>7</td>
<td>18%</td>
<td>3</td>
<td>43%</td>
</tr>
<tr>
<td>Pump Station new No.</td>
<td>3</td>
<td>-</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Roading Carriageway m²</td>
<td>11671807</td>
<td>1320375</td>
<td>11%</td>
<td>483,776</td>
<td>37%</td>
</tr>
<tr>
<td>Bridges/ Culverts</td>
<td>224</td>
<td>148</td>
<td>66%</td>
<td>100</td>
<td>68%</td>
</tr>
<tr>
<td>Retaining Walls No.</td>
<td>490</td>
<td>219</td>
<td>48%</td>
<td>75</td>
<td>34%</td>
</tr>
</tbody>
</table>

2.1 Transport Rebuild
The most significant component of the non-SCIRT roading budget is the Sumner Corridor programme with an original budget of $110,616,065 (including $110,177,075 for Sumner Road and $438,990 for the city-side locations). However the current estimate for the repair work on the Sumner-Evans Pass section is in the order of $60m. The projects within this programme of works are being progressed with the city-side locations progressing from concept design phase to detailed design phase and the consent process for the Sumner Rd project commencing through the distribution of the public information leaflet. However, it is unlikely that any physical works will commence this financial year as a funding decision has yet to be made by the Horizontal Infrastructure Governance Group (expected on 24 February 2015). Accordingly the required funding will need to be carried forward to next financial year.
Other major projects such as the An Accessible City (central city transport) projects are progressing with TP5 and TP9-11 currently under construction and on target, however TP6 Fitzgerald Avenue Twin Bridges, which has $6,600,000 allocated to it under AAC, has not met the eligibility criteria for funding under the cost share agreement and is likely to be returned to CCC to manage and repair under business as usual (LTP).

Riccarton Interchange & Bus Priority, Transport Corridor Optimisation Works, Coastal Pathway and Port Hills Mass Movement Remediation projects are all continuing.

The Tram Extension official opening is on the 12th Feb to coincide with the Cricket World Cup and trams will be operating continuously throughout the Cricket World Cup period. Post World Cup there are issues to be resolved with CERA /CCDU around continuing the tram regularly thru the Oxford Tce whilst construction of “The Terraces” section of the Avon River Precinct project is being constructed.

2.3 Infrastructure Rebuild Bridge Update

There will be a series of bridges completed this year which will be welcomed by the community and the travelling public.

2.3.1 Bridge of Remembrance and Triumphant Arch

A renewed media interest in the Bridge of Remembrance and Triumphant Arch has emerged as we enter the WW100 commemoration year. Although the bridge and arch restoration work has been challenging, which has resulted in increased cost and delays, it is pleasing to note that the RSA is understanding of the difficulties and supportive in the work that is being completed. With completion due in September, it will be available for commemorative services from Armistice Day in November this year.

Some of the complications arose due very difficult ground conditions which meant that the screw-pile methodology had to be abandoned during construction as the ground conditions proved more difficult than the original geotech investigations had indicated. The reinforcing cages planned for the internal columns had to be re-designed after contractors had gained access into the column cavities, the dimensions of which varied from the original drawings. This required 3D laser scanning to ensure the new reinforcing cages would fit into the cavity. An unexpected concrete “floor” had to be removed from inside the cavities, which was delicate work. The Orion 11kv cables that needed to be relocated were missed at the Early Contractor Involvement (ECI) stage and resulted in additional cost during construction. An escalation in the stone masonry work and in obtaining source material from Tasmania also added to the cost. As a result the forecast outturn construction cost is currently $6.5m up from an estimated $3m at the concept stage.

2.3.2 Ferrymead Bridge

Work on the Ferrymead Bridge is coming to an end with approach works, services, handrails and landscaping to occur. It is expected that traffic will be running on the new deck by the end of March and we propose to mark that occasion with a suitable bridge opening function.

2.3.3 Bridge St Bridge

Work on the Bridge St bridge in New Brighton is also nearing completion after a long and complex repair of the existing structure. This involved the inspection of pier piles below the tide, jacking up the existing deck, driving new piles that required drilling through the deck, new abutments and approach works. This bridge is due to open fully to traffic by about May 2015.
2.3.4 Moorhouse Overbridge
Work is due to start on the repair of the Moorhouse Ave overbridge at the intersection with Colombo Street at the end of the month. After assessing the possibility of demolishing the bridge and returning this to an “at grade” intersection, the decision was taken to restore the bridge and repair the damaged piles, which was also the least expensive option. Some disruption on Moorhouse Avenue can be expected with some lane reductions.

2.3.5 Gayhurst Bridge
The deck components are currently being craned into place on the Gayhurst Road bridge and the settlement slabs put in place. Some temporary approach works will be constructed while other decisions are made on the future red zone use and road closures in consultation with the local community. Substantial completion of this $5.5m project is expected late June.

2.3.6 Fitzgerald Twin Bridges
While the Fitzgerald Twin Bridges had been incorporated into the SCIRT programme for complete rebuild (due to the rotation of the bridge abutment and possible damage to the piles), NZTA have challenged the eligibility of the bridge replacement at this stage and called for a number of load assessment to be undertaken. After the results two separate proof loading exercises NZTA considered that the bridge could be operated in its current condition for up to 15 years, provided that regular (quarterly) inspections were made to ensure there was no progressive or sudden deterioration occurring. A provision of $12.8m (including the AAC component) is still in the SCIRT estimate but has not yet been allocated to this project and without partner funding, is unlikely to be allocated.

2.3.7 Pages Road Bridge
As part of the rebuild optimisation project, the Pages Road Bridge, which had been a candidate for replacement, will now be subject to a repair only, with the future replacement of the bridge being returned to the future renewals programme. The repairs will include the relocation of the temporary services currently located on the deck. Work is programmed to commence in July.

2.3.8 Gloucester St Bridge
Currently discussions are occurring between NZTA and CERA as to how this bridge fits into the new plans for the central city and whether it should not be replaced and become pedestrian and cycling only. It is expected that a decision on this will be made by the end of January.

2.3.9 Hereford St Bridge
This bridge is a repair not replacement. Under the Avon River Park project, CERA would like to widen the footpaths by removing the car parking. This will increase the dead load on the bridge and therefore it will require additional strengthening. CERA and NZTA are in discussion over whether to widen these footpaths. A decision on this is expected by the end of February.
2.4 CWTP (Wastewater Treatment Plant) Restoration

Structural repairs to Digester 3 are progressing and on current progress expect to hand back to CWTP for reassembly around the 12th Feb.

Trickling Filter 1 has been taken off line and good progress is being made on replacing the damaged 1200Ø discharge pipe and preparing the undercroft and tower for an Engineering assessment on the 29th January. The Trickling Filter is planned to be recommissioned on the 15th February, and once the biological processes have been restablished Trickling Filter 2 will be taken offline (4 week process to take Trickling Filter offline).

The damaged pipes under Cuthberts Road have been plugged, this section of the repair works to the plant are now complete.

Work has also restarted on the pressure main at the plant using an open cut method, as the trenchless method was not suited to the ground conditions.

2.5 Water Reticulation, Reservoirs and Pumping

Damage assessment on water assets is complete. All repair and development is scoped along with all wells to be replaced being identified. Decisions regarding relocation of Brooklands, Bexley and Averill pump stations are still to be confirmed and presently being investigated. Repair and development of wells is 99% complete with replacement of 30 wells 70% complete.

A number of water supply assets were damaged during the earthquakes which are not included within SCIRT’s scope includes 147 wells (and headworks) and 62 pump stations. There is an amount of unspecified minor damage to pump stations (cracks to buildings and walls etc) which are being handed back from SCIRT scope to be undertaken as part of the routine maintenance programme.

2.6 Stormwater and Land Drainage

At the Council meeting on 12 December agreement was given to progress the upstream works on Dudley Creek and to investigate alternative alignments downstream. Discussions have been held with potentially affected landowners for the alternative alignment option through Richmond Park and a RFP (Request for Proposal) has been issued to the market for this further investigation and to develop a Design and Construct (D&C) contract for the (upstream and downstream) works. The contract is expected to be awarded by 25 February.

The Tay Street Drain Pump Station works are progressing, but works on the inlet structure and culvert is slipping and is now due to be operational by the second week of March 2015.
3. Health and Safety

The following table details the Health and Safety statistics for the Infrastructure Rebuild Group including SCIRT, Water and Waste Rebuild, Transport Rebuild, non-SCIRT and Land Drainage Rebuild projects for the month of December 2014.

**Table 2: Health and Safety Statistics**

**Christchurch City Council - Facilities and Infrastructure Rebuild**

**Health and Safety Statistics - Month of December 2014**

<table>
<thead>
<tr>
<th>IRG Totals</th>
<th>Land Drainage</th>
<th>Water Waste</th>
<th>Transport</th>
<th>SCIRT</th>
<th>Non-SCIRT</th>
</tr>
</thead>
<tbody>
<tr>
<td>Near Misses</td>
<td>179</td>
<td>0</td>
<td>0</td>
<td>2</td>
<td>177</td>
</tr>
<tr>
<td>First aid injuries (FAI)</td>
<td>3</td>
<td>0</td>
<td>0</td>
<td>2</td>
<td>1</td>
</tr>
<tr>
<td>Medical Treatment Injuries (MTI)</td>
<td>2</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>2</td>
</tr>
<tr>
<td>Lost Time Injuries (LTI)</td>
<td>1</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>1</td>
</tr>
<tr>
<td>No. of days lost to LTIs</td>
<td>4</td>
<td>0</td>
<td>0</td>
<td>4</td>
<td>0</td>
</tr>
<tr>
<td>No. of hours worked</td>
<td>115,261</td>
<td>648</td>
<td>0</td>
<td>114,469</td>
<td>144</td>
</tr>
<tr>
<td>LTIFR (12 month average)</td>
<td>5</td>
<td>0</td>
<td>0</td>
<td>5</td>
<td>0</td>
</tr>
<tr>
<td>MTIFR</td>
<td>10</td>
<td>0</td>
<td>0</td>
<td>10</td>
<td>0</td>
</tr>
<tr>
<td>TRIFR (LTI + MTI)</td>
<td>15</td>
<td>0</td>
<td>0</td>
<td>15</td>
<td>0</td>
</tr>
</tbody>
</table>

**Health and Safety Statistics - Year to Date December 2014**

<table>
<thead>
<tr>
<th>IRG Totals</th>
<th>Land Drainage</th>
<th>Water Waste</th>
<th>Transport</th>
<th>SCIRT</th>
<th>Non-SCIRT</th>
</tr>
</thead>
<tbody>
<tr>
<td>Near Misses</td>
<td>5,617</td>
<td>0</td>
<td>0</td>
<td>5</td>
<td>5,610</td>
</tr>
<tr>
<td>First aid injuries (FAI)</td>
<td>132</td>
<td>0</td>
<td>0</td>
<td>1</td>
<td>129</td>
</tr>
<tr>
<td>Medical Treatment Injuries (MTI)</td>
<td>29</td>
<td>0</td>
<td>0</td>
<td>1</td>
<td>28</td>
</tr>
<tr>
<td>Lost Time Injuries (LTI)</td>
<td>5</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>5</td>
</tr>
<tr>
<td>No. of days lost to LTIs</td>
<td>25</td>
<td>0</td>
<td>0</td>
<td>25</td>
<td>0</td>
</tr>
<tr>
<td>No. of hours worked</td>
<td>4,623,223</td>
<td>648</td>
<td>0</td>
<td>4,610,063</td>
<td>12,512</td>
</tr>
<tr>
<td>LTIFR¹</td>
<td>3.2</td>
<td>0</td>
<td>0</td>
<td>3.2</td>
<td></td>
</tr>
<tr>
<td>MTIFR²</td>
<td>6.3</td>
<td>0</td>
<td>0</td>
<td>6.3</td>
<td></td>
</tr>
<tr>
<td>TRIFR³ (LTI + MTI)</td>
<td>9.5</td>
<td>0</td>
<td>0</td>
<td>9.5</td>
<td></td>
</tr>
</tbody>
</table>

1. Lost Time Injury Frequency Rate
2. Medical Treatment Injury Frequency Rate
3. Total Recordable Injury Frequency Rate
4. Environmental

There is ongoing concern being expressed on water quality in the city’s rivers, streams and beaches relating mainly to contamination from dry weather sewer spills and overflows due to the impaired condition of parts of the network that have not yet been repaired. Some pipeline defects may not be repaired under the SCIRT programme if they do not meet the revised design guideline DG43B and this will continue to be a risk for ongoing overflows to the city rivers and the ground water beyond the life of SCIRT.

There have also been incidents of “dirty dewatering” from construction sites where sediment control is either not present or not working effectively.

Damage to trees is also of concern with a significant non-compliance occurring during the month involving damage to a protected tree from hydro-excavation.

Monitoring of potential archaeological sites has also been a focus of attention in recent months to ensure that all SCIRT delivery teams, sub-contractors and utility companies are aware of and observe the requirements of our Archaeological authority and management plans.
5. Quality

Quality on the horizontal infrastructure programme is monitored through the accredited quality management systems of the main contractors working on the rebuild. Through routine audits, these systems identify quality defects which trigger a Non-Conformance Report (NCR) to be raised against each defect discovered. Contractors are measured more on their ability to close out NCRs quickly, rather than the total number generated.

Many defects relate to and pipe lining work (particularly on sewer laterals) and pipe dips. Correction of these defects is often required before handover can be completed, although some defects have been accepted as they would now no longer be eligible for repair under the criteria CERA have adopted even though they may have an impact on ongoing operations (including overflows to the environment) and costs.
6. Financials

(December financials unavailable at time of publication)

6.1 City Wastewater Treatment Plant Restoration

Progress on resolving claims with the insurers has lead to the CWTP restoration works being prioritised and programmed to mitigate the financial burden and risk associated with implementing restoration works ahead of agreements to settle being in place with the insurers. A claim for all works completed and planned was lodged with the insurers in June 2014.

Restoration works which do not represent a short term risk have been deferred pending settlement with the insurers. Works which are continuing, as the damage creates a risk to the process, are the repairs to the Trickling Filter ring beams and discharge pipes & the cleanout and repair of the digesters.

6.2 SCIRT Financial Summary

Table 5: SCIRT Results to December 2014

<table>
<thead>
<tr>
<th>Programme</th>
<th>Target Estimate</th>
<th>Life to Date</th>
<th>Cost to Complete</th>
<th>Forecast Final Cost</th>
<th>Variance from Target Estimate</th>
<th>Percent of Programme Cost (based on FFC)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Asset Assessment</td>
<td>134,058,074</td>
<td>127,797,654</td>
<td>8,544,630</td>
<td>136,342,254</td>
<td>1.7%</td>
<td>5.9%</td>
</tr>
<tr>
<td>Design</td>
<td>126,390,132</td>
<td>119,205,816</td>
<td>20,942,332</td>
<td>140,148,148</td>
<td>10.9%</td>
<td>6.1%</td>
</tr>
<tr>
<td>Delivery</td>
<td>1,633,160,821</td>
<td>838,406,328</td>
<td>646,158,548</td>
<td>1,484,564,876</td>
<td>-9.1%</td>
<td>64.2%</td>
</tr>
<tr>
<td><strong>Total Direct</strong></td>
<td><strong>1,893,609,027</strong></td>
<td><strong>1,085,409,799</strong></td>
<td><strong>675,845,489</strong></td>
<td><strong>1,761,055,288</strong></td>
<td><strong>-7.0%</strong></td>
<td><strong>76.2%</strong></td>
</tr>
<tr>
<td>Delivery Indirect</td>
<td>163,912,194</td>
<td>84,273,582</td>
<td>63,409,551</td>
<td>147,683,133</td>
<td>-9.9%</td>
<td>6.4%</td>
</tr>
<tr>
<td>SCIRT Indirect</td>
<td>169,275,346</td>
<td>102,675,148</td>
<td>38,265,571</td>
<td>140,940,719</td>
<td>-16.7%</td>
<td>6.1%</td>
</tr>
<tr>
<td><strong>Total Indirect</strong></td>
<td><strong>333,187,540</strong></td>
<td><strong>186,948,730</strong></td>
<td><strong>101,675,122</strong></td>
<td><strong>288,623,852</strong></td>
<td><strong>-13.4%</strong></td>
<td><strong>12.5%</strong></td>
</tr>
<tr>
<td>Limb 1</td>
<td>2,226,796,567</td>
<td>1,272,358,529</td>
<td>777,320,611</td>
<td>2,049,679,140</td>
<td>-8.0%</td>
<td>88.7%</td>
</tr>
<tr>
<td>Limb 2</td>
<td>270,110,073</td>
<td>148,196,434</td>
<td>113,824,513</td>
<td>261,820,947</td>
<td>-3.1%</td>
<td>11.3%</td>
</tr>
<tr>
<td><strong>TOTALS</strong></td>
<td><strong>2,496,906,640</strong></td>
<td><strong>1,420,554,962</strong></td>
<td><strong>809,945,125</strong></td>
<td><strong>2,311,500,087</strong></td>
<td><strong>-7.4%</strong></td>
<td><strong>100.0%</strong></td>
</tr>
</tbody>
</table>
7. Programme
Table 7: SCIRT Summary Programme December 2014

59% Overall SCIRT Programme Completed

81% Central City Programme Completed

8. SCIRT Projects in Handover
The number of projects in the Handover phase of the SCIRT process has decreased significantly over the last 18 months from a high of around 200 to approximately 50 projects. The overall value of projects in Handover has reduced to below $150M. The focus continues to be on improving the speed at which Handover is completed and costs fully capitalised. The value and project count below include CCC projects whereas most other presentations excluded CCC projects.

Table 8 – SCIRT Handover

![Total Number of Projects in Handover](chart1)

![Value of Projects in Handover](chart2)
9. Communications and Engagement

Table 9 – Summary of Work Notices and SCIRT Communications

<table>
<thead>
<tr>
<th>BULK COMMUNICATION</th>
<th>CITY</th>
<th>CARE</th>
<th>DONNER</th>
<th>FLETCHER</th>
<th>FILONI KOGAN</th>
<th>MCGINNELL DOWELL</th>
<th>DT</th>
<th>TOTAL FOR MONTH</th>
<th>RUNNING TOTAL SINCE AUGUST 2011</th>
<th>Lst month's total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Work notices/updates produced</td>
<td>16</td>
<td>11</td>
<td>42</td>
<td>46</td>
<td>20</td>
<td>137</td>
<td>4140</td>
<td>130</td>
<td>4140</td>
<td></td>
</tr>
<tr>
<td>Number of houses that received work notices/updates (approx.)</td>
<td>1,972</td>
<td>3,883</td>
<td>6,748</td>
<td>9,431</td>
<td>5,208</td>
<td>27342</td>
<td>1004605</td>
<td>40202</td>
<td></td>
<td></td>
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<tr>
<td>Email Updates</td>
<td>-</td>
<td>13</td>
<td>17</td>
<td>2</td>
<td>32</td>
<td>216</td>
<td>31</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Web-site updates</td>
<td>-</td>
<td></td>
<td></td>
<td></td>
<td>128</td>
<td>3966</td>
<td>105</td>
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</tr>
<tr>
<td>E-newsletters</td>
<td>-</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>191</td>
<td>6</td>
<td></td>
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<tr>
<td>Tweets</td>
<td>-</td>
<td></td>
<td></td>
<td></td>
<td>87</td>
<td>3608</td>
<td>133</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Face-to-face interactions (door-knocking, drop-ins approx.)</td>
<td>0</td>
<td>410</td>
<td>21</td>
<td>27</td>
<td>1</td>
<td>459</td>
<td>23699</td>
<td>809</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Meetings/presentations/briefings</td>
<td>2</td>
<td>7</td>
<td>3</td>
<td>1</td>
<td>13</td>
<td>2592</td>
<td>34</td>
<td></td>
<td></td>
<td></td>
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<tr>
<td>Consultation projects (since April 2012)</td>
<td>-</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>92</td>
<td>0</td>
<td></td>
<td></td>
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</tr>
<tr>
<td>Number of school visits</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>127</td>
<td>2</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Public display/event</td>
<td>-</td>
<td>1</td>
<td>0</td>
<td>0</td>
<td>1</td>
<td>95</td>
<td>3</td>
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<td>Public display/event attendance</td>
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<td></td>
<td></td>
<td></td>
<td>0</td>
<td>31526</td>
<td>504</td>
<td></td>
<td></td>
<td></td>
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<tr>
<td>Signage installed (excluding traffic signage)</td>
<td>14</td>
<td>10</td>
<td>2</td>
<td>10</td>
<td>52</td>
<td>4080</td>
<td>66</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Responses to hotline</td>
<td>102</td>
<td>31</td>
<td>89</td>
<td>42</td>
<td>52</td>
<td>521</td>
<td>13963</td>
<td>437</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Responses to email</td>
<td>37</td>
<td>68</td>
<td>48</td>
<td>40</td>
<td>26</td>
<td>270</td>
<td>8679</td>
<td>396</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Advertisements</td>
<td>-</td>
<td></td>
<td></td>
<td></td>
<td>160</td>
<td>160</td>
<td>1909</td>
<td>343</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Media coverage</td>
<td>-</td>
<td></td>
<td></td>
<td></td>
<td>30</td>
<td>30</td>
<td>680</td>
<td>38</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

10. People

In December 2014 the SCIRT Executive General Manager, Duncan Gibb was farewelled from the role after three and a half years of exemplary service to the SCIRT Alliance. On the same day, Design Manager Steve Hart also left the organisation due to his retirement. Duncan has been replaced by Ian Campbell, former Delivery Manager and Steve has been succeeded by Paula Locke.
Within the Infrastructure Rebuild Group, recruitment for key positions will continue during the first quarter of 2015 for Project Managers, Contract Supervisors and technical specialists.
Christchurch Horizontal Infrastructure Rebuild Programme – November 2014 Progress Dashboard

$1.886 million has been spent to date on the horizontal infrastructure programme to 30 November 2014. This is $642 million below the programme estimate remaining. Of this, $239 million was spent during November 2014.

$422 million is committed (in construction or construction allocation). This results in $1,034 million from April 2014, it was decided that projects that had been previously designed (but not allocated to construction) would be redesigned to the most appropriate design guideline. The financial benefit to the rebuild programme, for redesigning any programme (including costs and workload) has been calculated. This created a delay in the number of projects that could be released to construction and therefore put the programme further behind schedule.

**Is the rebuild progressing on time?**

**Is the rebuild progressing on budget?**

**Is the rebuild progressing to specification?**

The graph compares the value of the work completed to the amount spent. Prior to July 2013 SCIRT was approximately $30m over budget (around 5% of construction spent to date). Due to programme delay, being behind forecast schedule.

**Quality of Construction KPI**

The value for money KPA uses quality of construction as a KPI. This provides a view on the quality of design, documentation and construction. The quality of design and documentation is measured through the number of requests for information are raised on individual projects.

The graph shows a reduction in the KPI associated with the quality of construction. SCIRT state this is due to an increased focus on detail during the site review of reporting in the quality systems. This means that the site team are better engaged in what they record against, their quality measures and actions and the scoring system is progressively more reliable as a measure of site attention to detail.

It is important to note that whilst the KPI has reduced over the last nine months, the current performance score is still above the minimum threshold.

**How much has been spent across each programme?**

**How much has been spent by each funder?**

**How much has been spent across each programme?**

### Financials/Output Management

<table>
<thead>
<tr>
<th>Category</th>
<th>$m To Date</th>
<th>To Come</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Programme Ops</td>
<td>243</td>
<td>5.20</td>
<td>248</td>
</tr>
<tr>
<td>Temporary Repairs (Ops)</td>
<td>266</td>
<td>7.2</td>
<td>338</td>
</tr>
<tr>
<td>SCIRT</td>
<td>1,281</td>
<td>909</td>
<td>2,189</td>
</tr>
<tr>
<td>Other</td>
<td>42</td>
<td>9</td>
<td>51</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>1,886</td>
<td>1,456</td>
<td>3,342</td>
</tr>
</tbody>
</table>

### Combined Funding Limit

<table>
<thead>
<tr>
<th>Funder</th>
<th>$m To Date</th>
<th>To Come</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>DIA</td>
<td>205</td>
<td>0</td>
<td>205</td>
</tr>
<tr>
<td>CERA</td>
<td>675</td>
<td>285</td>
<td>960</td>
</tr>
<tr>
<td>NZTA</td>
<td>287</td>
<td>348</td>
<td>635</td>
</tr>
<tr>
<td>CCC</td>
<td>719</td>
<td>424</td>
<td>1,143</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>1,886</td>
<td>1,057</td>
<td>2,943</td>
</tr>
</tbody>
</table>

### Is the rebuild progressing on time?

When Earned Value Reporting began (April 2013), this initial programme was behind schedule due to construction not ramping up as quickly as intended in the early stages of SCIRT. Progress was made over the subsequent five months to bring the programme back to the budgeted amount. As of November 2013, $160m of pressure wastewater (PWW) pipeline was put on hold by the funders because of a legal decision relating to where PWW tanks could be installed. This created a shortage of programme costs as the programme workflow is now 0.7% which is down from 0.8% in October.

Quality of Construction KPI uses quality of construction as a KPI. This provides a view on the quality of design, documentation and construction. The quality of design and documentation is measured through the number of requests for information are raised on individual projects. This process has resulted in the programme going over budget from June 2014 due to the programme workflow experiencing slowdown across most phases (design, estimating and construction), as projects planned for transfer into construction were delayed or offset while the crosswalk costs remained constant across the programme.


**How much has been spent across each programme?**

<table>
<thead>
<tr>
<th>Category</th>
<th>$m To Date</th>
<th>To Come</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Response (Opex)</td>
<td>243</td>
<td>($29)</td>
<td>214</td>
</tr>
<tr>
<td>Temporary Repairs (Opex)</td>
<td>266</td>
<td>($2)</td>
<td>264</td>
</tr>
<tr>
<td>SCIRT</td>
<td>1,281</td>
<td>($28)</td>
<td>1,253</td>
</tr>
<tr>
<td>Other</td>
<td>42</td>
<td>($3)</td>
<td>39</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>1,886</td>
<td>1,456</td>
<td>3,342</td>
</tr>
</tbody>
</table>

**Is the rebuild progressing to specification?**

The graph shows a reduction in the KPI associated with the quality of construction. SCIRT state this is due to an increased focus on detail during the site review of reporting in the quality systems. This means that the site team are better engaged in what they record against, their quality measures and actions and the scoring system is progressively more reliable as a measure of site attention to detail. It is important to note that whilst the KPI has reduced over the last nine months, the current performance score is still above the minimum threshold.

The Cost Sharing Agreement makes provision for an independent assessment of costs associated with the Cost Sharing programme. This process has resulted in the programme going over budget from June 2014 due to the programme workflow experiencing slowdown across most phases (design, estimating and construction), as projects planned for transfer into construction were delayed or offset while the crosswalk costs remained constant across the programme.
### Value Management

**Christchurch Horizontal Infrastructure Rebuild Programme – November 2014 Progress Dashboard**

#### Is the programme achieving value for money?

In June 2012, the Client Governance Group (CGG) agreed to adopt the New Zealand Treasury’s Framework for Value for Money. This framework assesses:

- a) Economy (investing less / optimising resources);
- b) Efficiency (investing well / maximising outputs and quality); and,
- c) Effectiveness (investing wisely / ensuring outcomes and benefits are met).

Together, these metrics show whether the funders are achieving Value for Money for their investment in the Horizontal Infrastructure Rebuild.

The Christchurch Horizontal Infrastructure networks are in a functional state from an end-user perspective. Residents have freshwater supply, wastewater services and roads drain storm-water following rainfall.

**Sound bites:**

The Audit Framework TOC Review found that the SCIRT TOCs represent fair market value. This provides the funders assurance around the Economy aspect of Value for Money Framework. This is illustrated in the TOC chart and the inflation monitor further supports this finding.

The ‘on-time’ and ‘on-budget’ charts illustrate that progress is needed in the Efficiency aspect of the Hi Rebuild. SCIRT’s initial delays and the funder’s directive for a new Design Guidelines have slowed the SCIRT rebuild and added (short term) cost (for long term benefit). Productivity metrics are also being sought to provide further insights into this aspect of the VFM framework.

The reduction in Operating Costs from the levels in the 12 months following the earthquakes provides a level of assurance over the Effectiveness’ aspect of the Value for Money Framework. Further assurance will be provided from the additional Levels of Service metrics once provided by the CCC.

#### Operating costs progress – Three Waters

The SCIRT Construction Price Index tracks the changes in prices of the Construction Phase of SCIRT’s programme. Each monthly prices and base cost of goods are based on the projects prepared by the Estimators in that month. This is compared to a compound index that uses the RPI index.

The SCIRT Construction Price Index has shown the contourment of costs well up to what might have been expected. The major changes in the last few months reflect a significant change in the labour cost and the materials cost. The data has a tendency to be more variable at present due to the low number of projects being estimated.

Note that the Construction Industry Inputs series is still only up to date to August 2014 due to the construction lag from Statistics NZ.

#### Operating costs progress – Roading

The three waters operating costs are tracking down, however these costs will remain approximately double the pre-quake business as usual levels. Council is continuing to seek a gradual decline in routine maintenance works required in the 3 W, but it is not inline with the original expectations. The reduction is a combination of storms and good weather. Current predictions of 3 worker costs are that they will remain close to current levels for some time until the full rebuild of the assets can be realised (due to weather conditions). This increase in day-to-day operating costs is a seasonal effect that happens on an annual basis, this does not effect earthquake related operating costs.

Modelling has been undertaken to gain a better view of the long term costs and has been provided as part of the independent review.

#### Level of Service Indicators

The December Dashboard will include metrics on CCC’s Level of Service Indicators, including:

- a) Wastewater overflows
- b) Wastewater overflows
- c) Night time flows to Brindley
- d) Night time flows to Brindley
- e) Roadside Maintenance/Rehab
- f) Roadside Maintenance/Rehab
- g) Roadside Maintenance/Rehab

Data for this month’s update was not available. Progress has been made and we will report this in the December update.

#### SCIRT Cost Ratios

The December Dashboard will include metrics on SCIRT’s Level of Service Indicators.

#### Operating costs progress – Three Waters

The graph above reflects the effects of the earthquakes and subsequent repairs and rebuilding on the operational costs for the Roading network.

Some of the previous months Port hills remediation costs relating to mass movement have been removed and reflected in the above graph. Day-to-day operations numbers are still affected by response costs relating to the Storm damage, but the earthquake related costs are still tracking according to previous forecasts.

- SCIRT's initial delays and the funder's directive for a new Design Guidelines have slowed the SCIRT rebuild and added (short term) cost (for long term benefit).
- Productivity metrics are also being sought to provide further insights into this aspect of the VFM framework.
- The reduction in Operating Costs from the levels in the 12 months following the earthquakes provides a level of assurance over the 'Effectiveness' aspect of the Value for Money Framework.
- Further assurance will be provided from the additional Levels of Service metrics once provided by the CCC.
PART B – REPORT FOR INFORMATION

5. UPDATE REGARDING WORK OF THE GREATER CHRISTCHURCH PUBLIC TRANSPORT WORKING GROUP

1. PURPOSE AND ORIGIN OF REPORT

1.1 The purpose of this report is to update the Infrastructure Transport and Environment Committee of the work of the Greater Christchurch Public Transport Working Group (GCPTWG).

1.2 In the Council’s Committee structure the GCPTWG sits under the Infrastructure Transport and Environment Committee and as such there is a requirement for the GCPTWG to report to the Committee on a regular basis.

2. BACKGROUND

2.1 At its meeting of 11 September 2014 the Council adopted a new governance and decision making structure that would come into operation on 1 October 2014. This included the formation of the Infrastructure Transport and Environment Committee and its subordinate bodies, one of which was the GCPTWG.

2.2 The GCPTWG was already in operation in a number of different guises before this Council resolution. Initially it was the Public Transport Working Group, and was set up by the Council and Environment Canterbury (ECan) to progress the recovery of public transport. In July 2013, following confirmation of the cost sharing agreement between the Crown and Council, representatives from New Zealand Transport Agency (NZTA) and the Canterbury Earthquake Recovery Authority’s Christchurch Central Development Unit (CCDU) were invited to join. In August 2014 the Group agreed to incorporate all of Greater Christchurch and so was further expanded to include representative from Selwyn and Waimakariri District Councils and became the GCPTWG.

3. COMMENT

3.1 As a subordinate body of the Committee, the GCPTWG has now met twice: on 26 November and 10 December 2014.

26 November 2014 Meeting

3.2 At the first meeting of the GCPTWG as a subordinate body of the Infrastructure Transport and Environment Committee the Group:

3.2.1 agreed its Terms of Reference (in conjunction with external partners)

5 Cont’d

10 December 2014 Meeting

3.4 At this meeting the Group discussed the following topics:
   • Bus Stop Audit
   • Cycle Capacity on Buses
   • Riccarton Update
   • Update on Budgets for Public Transport Infrastructure
   • 2015 Meeting Timetable
   • Bus Interchange
   • NZ Climate Change.

4. CHAIRPERSON’S RECOMMENDATION

   It is recommended that the Infrastructure Transport and Environment Committee receive the report.
6. RESOLUTION TO EXCLUDE THE PUBLIC

Attached.
RESOLUTION TO EXCLUDE THE PUBLIC


I move that the public be excluded from the following parts of the proceedings of this meeting, namely the item listed overleaf.

Reason for passing this resolution: good reason to withhold exists under section 7.
Specific grounds under section 48(1) for the passing of this resolution: Section 48(1)(a).

This resolution is made in reliance on Section 48(1)(a) of the Local Government Official Information and Meetings Act 1987 and the particular interest or interests protected by Section 6 or Section 7 of that Act which would be prejudiced by the holding of the whole or relevant part of the proceedings of the meeting in public are as follows:
<table>
<thead>
<tr>
<th>ITEM NO.</th>
<th>GENERAL SUBJECT OF EACH MATTER TO BE CONSIDERED</th>
<th>REASON UNDER ACT</th>
<th>SECTION</th>
<th>PLAIN ENGLISH REASON</th>
<th>WHEN REPORT CAN BE RELEASED</th>
</tr>
</thead>
<tbody>
<tr>
<td>7.</td>
<td>Christchurch District Energy System Progress Report</td>
<td>Conduct of negotiations</td>
<td>7(2)(i)</td>
<td>Commercial negotiations are underway between the parties</td>
<td>By 30 June 2015</td>
</tr>
</tbody>
</table>
Chairperson’s Recommendation: That the foregoing motion be adopted.

Note

Section 48(4) of the Local Government Official Information and Meetings Act 1987 provides as follows:

“(4) Every resolution to exclude the public shall be put at a time when the meeting is open to the public, and the text of that resolution (or copies thereof):

(a) Shall be available to any member of the public who is present; and
(b) Shall form part of the minutes of the local authority.”